

eCULTURE

Volume 1

2008

Article 4

Business Edge: A Transformative Perspective

Greg Parry*

*Edith Cowan University, g.parry@ecu.edu.au

Copyright ©2008 by the authors. *eCULTURE* is produced by The Berkeley Electronic Press (bepress). <http://ro.ecu.edu.au/eculture>

Business Edge: A Transformative Perspective

Greg Parry

Abstract

Arguably, most undergraduate education in business schools focuses on transmitting knowledge from teacher to student, the goal being for students to acquire facts, practical or technical skills and specific problem solving strategies (Cranton, 1994). Students feel comfortable with this positivistic learning situation as it is goal-directed and certified by a diploma or degree. Many of the teaching styles and the learning activities we believe enable us to 'teach effectively' are related to this transmissive paradigm of education. Adult learners, by contrast, need to know why they need to know something before undertaking to learn it. Learning becomes a process of increasing competence to achieve one's life potential, so learning is a much more meaningful experience. Effective, lasting (lifelong) education behoves us as instructors to create educational situations that expose student limitations, undertake critical self-reflection, and examine new ideas and approaches – to become learning partners. This paper describes the way in which the Business Edge program brings elements of transformational experience to students in their undergraduate studies. Drawing on content analysis of reflective journals maintained by students involved in this programme, the paper presents some exploratory research that examines the extent to which the introductory unit of the program has contributed to that evolution.

Business Edge: A Transformative Perspective

Greg Parry

School of Accounting Finance and Economics

g.parry@ecu.edu.au

Abstract: Arguably, most undergraduate education in business schools focuses on transmitting knowledge from teacher to student, the goal being for students to acquire facts, practical or technical skills and specific problem solving strategies (Cranton, 1994). Students feel comfortable with this positivistic learning situation as it is goal-directed and certified by a diploma or degree. Many of the teaching styles and the learning activities we believe enable us to 'teach effectively' are related to this transmissive paradigm of education. Adult learners, by contrast, need to know why they need to know something before undertaking to learn it. Learning becomes a process of increasing competence to achieve one's life potential, so learning is a much more meaningful experience. Effective, lasting (lifelong) education behoves us as instructors to create educational situations that expose student limitations, undertake critical self-reflection, and examine new ideas and approaches – to become learning partners.

This paper describes the way in which the Business Edge program brings elements of transformational experience to students in their undergraduate studies. Drawing on content analysis of reflective journals maintained by students involved in this programme, the paper presents some exploratory research that examines the extent to which the introductory unit of the program has contributed to that evolution.

Introduction

Universities face considerable community scrutiny about the relevance of the courses they teach for the world of work and the demands of the 'new economy'. From society's point of view, understanding in the postmodern world requires not only knowledge and comprehension but also what Wiggins and McTighe (1998, in Glisczinski, 2007) called perspective, empathy, and self-knowledge, which require learners to analyze information from a variety of perspectives, explain other people's experiences, and act on this learning in their own lives. From a business point of view, universities and TAFE Colleges are, according to the Business Council of Australia (2002) turning out graduates who are not 'job ready'. The BCA report accused universities of stifling entrepreneurship and producing graduates with inadequate problem-solving ability, creativity, initiative and communication skills.

Knowledge and Knowing

Many of the teaching and learning practices we use focus on transmitting the knowledge (as a component) from teacher to student, where undergraduate programmes strive

ECULTURE

to deliver in a few short years the instrumental learning (Habermas, 1984 in Glisczinski, 2007)) that equips students to begin their professional life. What business (and society?) appears to be saying to business schools, however, is that they value graduates who demonstrate knowledge beyond the instrumental. They value communication and teamwork skills and the ability to learn quickly.

In understanding what that might mean, it is perhaps useful to think of a continuum along which students could develop (and our teaching and learning practices could promote) from acquiring knowledge organised by others to understanding ideas and values, or, as Willimon put it (in Glisczinski, 2007), gaining wisdom. Table 1 reflects on the labels which have been applied by a number of authors to characterise what we might regard as a knowledge / knowing continuum. From a normative perspective, all of them would promote a shift from left to right in adult education.

		KNOWLEDGE Acquisition of organised knowledge	<i>development of intellectual, life, work skills</i>	KNOWING Understanding of ideas and values
Student learning	Miller and Seller (1990)	Transmissive	Transactional	Transformative learning
	Habermas (1984)	Instrumental learning	Communicative learning	Evaluative learning
	Wiggins and McTighe (1998)			Perspective, empathy and self knowledge
	Blooms cognitive taxonomy (1976)	Uncritical acceptance	Insightful evaluation	Synthesis
	Glisczinski (2007)	Knowledge and comprehension		Perspective, empathy and self knowledge
	Saljo (1979)	Acquiring information	Making sense	Understanding reality in a different way
	Entwistle and Ramsden (1983)	Surface learning		Deep learning
	Bassett (2005)	Factual and procedural knowledge	Knowledge regarding the context of life	Knowledge which considers the uncertainties of life
	Perry (1989)	Either/or thinking (dualism)	Subjective knowledge (multiplicity)	Constructed knowledge (relativism)
Teacher behaviour	Andrews (2005)	Knowledge provider		Knowing partner
	Grow	Authority– teacher as expert	Motivator, guide. Supporting practice, coaching.	Facilitator, consultant

Table 1: From Knowledge to Knowing – an Evolution in Learning and Teaching.

ECULTURE

Transmissive educational processes tend to result in surface learning that focuses on the elements of a task rather than the whole; tend to define learning as a memory task, and take a perspective on the subject matter that is external to oneself. Surface learning is passive, and features little cognitive engagement (Entwistle and Ramsden, 1983).

Transformative learning (one of the labels applied to the knowing end of the spectrum) is the name given to the process by which students question their habits of mind to learn to think for themselves and become more discriminating, open and reflective (Feller et al, 2004; Mezirow, 2003). In what we may refer to as its ‘strong’ form, learners experience a change of perspective or a greater openness to new ideas, issues, and views. This is a process that develops new ‘perspective meaning’ (Mezirow, 1981) by which to view and interpret life experience. Potential transformation, according to McGongal (2005) is a result of learners being exposed to events which exposes the limitations of their current knowledge or approach; having opportunities to undertake critical discourse with other students in examining other ideas and perspectives and opportunities for critical self-reflection.

Table 1 also reflects on the behaviours that teachers might demonstrate along the continuum from transmitting instrumental knowledge to becoming a knowing partner (Andrews, 2005). The approach to learning and knowledge is not a characteristic of the student, but a response to the situations in which they find themselves. If gaining wisdom is an objective of university education, achieving it involves revision of the curriculum and teaching and learning approaches to create an environment that facilitates transformation.

The Potential Contribution of Business Edge to Learner Transformation

An example of such an approach is the ‘Business Edge’ program that forms a core part of the Bachelor of Business degree at Edith Cowan University in Western Australia. Comprising four of the degree award’s 24 units, Business Edge targets employability (in the sense of ‘know how’ rather than ‘know what’), successful intelligence and reflection. Two of the program’s units are located in the first year of the degree: one in each in the second and third years. In the introductory unit, teaching and learning activities help students come to grips with learning styles, information literacy, working with others in a team, critical thinking, and business communication (business writing and presentation skills). The second unit targets numerical and statistical skills, and includes learning activities in which students summarise and synthesise data into various business and non-business documents. In the second year unit, students focus on employability skills such as networking, negotiation and mediation skills. The final unit focuses on the wider context in which business works, looking at the idea of social responsibility and business ethics, information and research skills and project management.

Three of the key potentially transformative elements of the program are described below – the focus on teams; the content-free, student-centred learning activities; and the importance of reflection.

The Teams

The physical setting of the teaching space helps to create a ‘team atmosphere’. The students, of whom there are 25-30 in a class, sit in groups of four or five at large tables configured to enable the use of laptop computers, including a display monitor on each table on which the image from any student computer can be shared among team members. Images

ECULTURE

from group monitors can also be shared amongst the class on the room's projector. Whilst reconfiguring a computer lab in this way is a high cost option, it helps to establish a real point of difference for students because it changes the focus of the learning space away from the instructor into student groups, and creates the sense that students will be closely involved, by virtue of their team membership, in the construction and sharing of their knowledge. In the semester described below, students were allocated to new teams three times in the course of seven weeks. Although used interchangeably here, the term 'team' carries more weight than 'group' in the design of this program, as the key activities of the unit focus on developing teamwork skills, not just collaborating with other members of a group.

The Learning Activities

Business Edge is student centred, and relatively content free. The tasks in which learning activities are framed are ill-defined and have no 'correct answer'. Importantly, the teacher acts as a facilitator rather than a gatekeeper and director. The emphasis is on students taking responsibility for their learning, being an active participant in the tasks, and developing their knowledge and experience in collaboration with other members of their team.

Table 2 summarises the learning activities in the first unit of the program (BES 1100: Foundations of Business Knowledge) in semester two, 2007. The activities are all based on challenges that (what we suspect are) typical of those faced by first year business students:

- how to overcome varying degrees of familiarity with information technology and office productivity software to become proficient in presenting information in words, number and graphical formats .
- becoming an organised and effective learner in a less structured environment than that with which they are familiar (i.e. secondary school).
- working with others in teams (what role to play, how are behaviours changed in high stakes team activities).
- preparing and delivering business presentations and business documents (e.g. emails, memos, newsletters)

Activity	Task
1 Learning styles	Complete a learning styles inventory – what does it tell you about your preferred learning style and other options? Were you aware of this preference?
2 Office productivity software (MS Office)	Complete the training and testing modules for MS Word, Powerpoint and Excel. Demonstrate the techniques learned in your team presentation and deductive report.
3 Teamwork – young driver activity	Prepare a group oral presentation to road safety authorities from the perspective of managers of a firm that employs young delivery drivers. Apply appropriate presentation skills
4 Business documentation	Write an individual deductive report that presents the case developed by your group in activity three above
5 Reflective journal – group work	Critically reflect on the processes of team work, leadership and organization used to prepare activities three and four.
6 Individual report	Prepare an individual oral presentation (5 minutes) to the board of an investment company on whether it should invest in nuclear energy as a source of 'cleaner' power.

Table 2: Business Edge 1110: Learning activities

ECULTURE

Transformation and the gaining of wisdom follows from having to face and overcome a real or perceived challenge. The activities above contain a number of challenges, or what (McGonigal, 2005) calls activating events. Proponents of transformative education in its strongest form may not regard these as activating events - events that cause students to examine their thinking, the limits of their understanding, the presence of conflicting viewpoints or even the fear of failure. They do however seem to impose considerable challenges for many students.

Each student was required to make two verbal presentations in this unit – for many, the prospect of making a presentation to an audience of classmates and invited guests is outside their ‘comfort zone’.

This class was the time for me to experience my speech which I had developed over the past few weeks. I was feeling a little nervous before I started, I reminded myself that the nervous feeling tells me that I am about to do something that will improve my personal skills for the future. After the speech I sat down at the desk and felt I had achieved a new level of personal development that can be ready to be challenged in the real working environment. (Student Th 5)

About my presentation...I don't think it will be too good. I'm always getting so nervous when I shall speak in front of an audience, and by getting nervous I'm ending up to not know what to say, and when I'm saying it it all sounds strange and with the wrong words, not at all what I have created in my mind. To learn from this is that I will need to do A LOT of practice for the oral presentation, and by challenging yourself, you grow...or....? (Student T 17)

The Importance of Reflection

To create the potential for students to gain wisdom, the curriculum design process has to foster engagement and critical reflection. A key aspect of the program is that students engage in critical reflection, submitting a weekly journal using a blog in the Blackboard learning management system. Students were not required to use academic style for the journal but were encouraged to ‘expose’ their own values, beliefs and attitudes underlying their reactions to various learning situations and to reflect on how they might affect their studies and their world in general. Journal entries were hidden from other students, but were accessed and commented upon by staff. In the author’s case, feedback often consisted of encouragement to go beyond description and use interpretive and evaluative statements to show what they had learned about themselves and others in their team, and about the process of teamwork.

Berger (2004) explains that reflection that just lets a person see what already is unlikely to lead to new actions, but when reflection starts to question assumptions, use new lenses and to view new possibilities it is, by definition, transformational. Critical reflection is useful when undertaken about something outside one’s comfort zone, and in a social context, about interactions and relationships (Cranton and Carusetta, 2004). To encourage critical reflection rather than mere description, a 'DIEP' model of reflective journal writing was employed (describe – interpret – evaluate – plan). On Mezirow's (1981) three levels of reflectivity, description is regarded as non-reflection, because the student has not

ECULTURE

demonstrated any reflective thought. Hence, only the 'IEP' components constitute some level of reflectiveness. Interpretation is characterised by the student demonstrating awareness involving explanations of connections, feelings, conclusions and expectations. Evaluation involves making judgements about what was observed or transpired, often involving an opinion that portrays whether an event was new or challenging to the student, or caused them to question a previous frame of reference. Planning involves reflection on how knowledge learned in the event / learning experience may change future approaches to problems or courses of action. Plans reflect the student becoming aware of the necessity for further learning or how different perspectives could improve their understanding.

Teaching staff (facilitators, guides) also completed a journal entry each week. Staff journals should also have followed the DIEP approach, going beyond describing how each week's activities were operationalised. Reflections evaluated how activities had worked and could be improved, and, as the semester progressed, critically reviewed their own performance as a guide and teacher in a student-centred environment. Staff reflection has proven an important tool in sharing experience among a variety of teaching staff (permanent and sessional staff from the four schools in the Business faculty). The staff journals reflected those proposed in Grow's stages of learning autonomy (in Wang and Sarbo, 2004) that describes four stages in learning autonomy (learners move through stages as dependent, interested, involved and then self-directed learners) and how they correspond to different teaching methods and styles (coach, motivator, facilitator and consultant).

Exploratory research

Exploratory research undertaken by the author to date seeks to evaluate whether participation in the initial Business Edge unit produced evidence of students undergoing one of the key components of learning transformation – "critical reflection on their own disposition as learners" (Glisczinski, 2007 p. 325). Data for this exploratory study is comprised of the journal entries of students (n = 68) in three of the nine Business Edge 1110 classes in semester 2, 2007. One of the three classes in this sample consisted primarily of mature-age part-time students most of whom held a full-time job. The other two classes consisted of full time students, usually in their first or second year out of secondary school. Just over one third of the students sampled contributed a journal entry in all ten weeks of class contact.

Content analysis was used to analyse the journal records. Content analysis involves the categorisation and classification of communication, in this case amounting to two or three paragraphs per journal entry per student. Content analysis can be quantitative or qualitative (McMurray et al, 2004). As a quantitative procedure, it requires that themes can be identified and categorised. The author initially counted the entries and read all the data to gain familiarity with the reflections. In the next stage, journal entries were coded by assigning a proportion of the entry to each element of the DIEP classification described above. A sample comprising about one quarter of the entries was independently coded by another lecturer in the Business Edge program, in light of the criticism of this type of qualitative analysis that valid inferences require the classification procedure be reliable in the sense of being consistent both for inter-coder reliability (reproducibility) and intra-coder reliability.

The literature seems quiet on data about the extent to which students feel they have experienced disorienting dilemmas, critical reflection and 'transformational situations' in their university studies, so it is difficult to establish a benchmark for comparison. A study of 153 teacher education students by Glisczinski (2007) found that less than half had engaged in

ECULTURE

any level of critical reflection in their college career, broadly defined as both classroom and campus life. Another study of first year communications students by Paton (2006), found that just one-third were 'non-reflective'.

For the journal entries sampled for this study, 79% of responses were judged to be descriptive, with the proportion of individual entries from 30 per cent to 100 per cent description. 11% of journal entries included interpretive feedback; 6% evaluative; and 3% planning. Whilst the low rate of reflection / high rate of description may be regarded as disappointing, this should perhaps be interpreted liberally. Firstly, the unit is the first in the series of four – the typical respondents being in the first year of their degree and in the early stages of any transition that, from a transformative perspective, we hope they might eventually make between being adolescent (accepting) and adult (questioning) learners. Secondly, the program was, at that stage, new to the staff involved. We will ourselves undergo some transformation in teaching, a key aspect of which will be a transition from instructor to facilitator. For example, although reflective journals have been designed into the program, we probably do not make enough of their potential power for students, nor encourage a dialogic view. It may also be the case that students do not engage in reflection so close to the event. The journals in most cases were written within a few days of classes, and were clearly focussed on the minutiae of day to day events than the 'big picture'. We might also question the extent to which students in content-based, teacher-directed units in the degree program (such as Economics or Accounting or Marketing) would be critically reflective of their experiences in those 'core' units?

Used as a qualitative procedure, content analysis searches for commonalities that appear or are latent in documents (Hsieh and Shannon, 2005). In this case, the reading of student journals was informed by the criteria described in table 1 above. Reading of the journal entries searched for three kinds of meaning (Murray-Thomas et al, 2003) – meaning in the sense of interpretation, evaluation and planning. A considerable amount of interpretation is obviously involved to resolve ambiguities in the entries. The difference between descriptive and dialogic reflection is also noted – the former has some attempt to provide reasons / explanations for events or actions, but in a reportive way; the latter demonstrating some 'stepping back' from the events, exploring their meaning and having some discourse with self. Interpretation is evident when students seek to explain, give insights or draw conclusions about events or interactions that occurred in their team. Evaluation is characterised by journal entries that make judgements about events or interactions, often focussing on extent, effectiveness or efficiency. Planning is characterised by entries that state how information will be useful to the learner in the future, or how the student will draw upon an experience in the future.

Indicators of transformation

As discussed above, quantitative analysis of journal entries suggested that only 20 per cent of journal entries could be interpreted as reflective. The selection of comments below are drawn from that portion.

One of the activities described in table 2 involved understanding one learning preferences by completing one of the learning styles inventories available on the Internet. A number of students found confirmation of what they had already suspected about themselves as learners, one planning to apply the insight to understanding how processed instructions in a work environment.

After showing so many people, (how to complete an origami task used as an icebreaker for the first group activity) I've really started to notice some of the differences in peoples learning styles. When I received the instructions I didn't read the text, because to me the text is in the shapes the fold lines were creating in the pictures. However most people in my workplace seemed to be the Auditory/Visual type of learner, they needed to hear the instructions or read them on the paper.
(Student W15)

As discussed, the activities in this unit all focus on working as a team. Of those who wrote reflectively in their journals, many commented on the roles undertaken by members of their team, the contributions made by individuals and, occasionally, evaluative comments about their own performance and how others see them.

It was weird but understanding today when I was told that I was seen as the group leader. Weird because I don't necessarily see myself as an 'authoritative' type person but understanding because I drew up the duties table, determine what is to be completed each week, usually question everyone's opinions or statements (simply to ensure that the work is accurate and correct), always having the homework completed etc... Sometimes I do look back on the class and think that maybe I was too demanding but that thought quickly evaporates as I then realize that if I didn't make sure everyone knew what they were doing, it would likely never get done and we would be much further behind schedule. If I am ever regarded as being a team leader again I think I would behave much the same way but maybe try to think of ways to get team members more involved in talking about what to do next and what the best way of completing our objectives would be.
(Student Th 13)

Reflections about nature of teamwork and responsibility to others were prominent amongst those who wrote critically about their experience.

The reading for week 4, made me remember of my previous occupation for which I worked for more then six months - I was a simple worker and out of the blue, I was promoted for a higher position. What came to my mind while reading this chapter, was all the responsibilities I had as an employee, toward the customers and the employees working on my shift, but had not realised. At the beginning it was a struggle and a never-ending shift. I had lots of conflicts with customers that weren't happy with our products and conflicts between certain employees who disliked one another.

Four days later I was taken back to the past experience once again, although it was an entirely different situation. On Friday 24th of August, we had a group meeting to plan out our flowchart for the drivers' activity assignment due on Monday of the following week. We had agreed that each group member would bring their own research. So the time came we got comfortable and switched on our laptops. I imagined everyone was prepared and destined to design the flowchart and finish it within an hour. That's where my imagination went wrong. I tried not to look shocked or disappointed, but I was. I had done my part. I put on a "who cares" expression on my face. I asked myself "Is this the meaning of a group?"
(Student W 11)

ECULTURE

In the next reflection, the student demonstrates insight into the meaning of ‘fairness’ – teams may only achieve a result when non-performance is confronted:

I must say I'm disappointed at myself and my performance. Also at the grade my group was given. We did so much for so little. I felt that I failed them as a leader. I tried my best but it wasn't enough. Sometimes being fair is not being fair, I guess it's a word that many of us eat up. (Student M3)

On a positive not however I did learn from last weeks chapter reading that the way to deal with yes people in the group environment is to 'talk honestly to the "yes people" and let the people know it is safe to disagree with me or anyone else on the team.' I attempted to use this technique during the week of our on task group assignment and I found this tool to be extremely effective. Both team members appeared to be more involves in the groups conversation, adding in their own ideas and opinions and objecting to issues they felt where unacceptable to them. (Student M5)

Ultimately, the objective of the unit is to push students towards understanding of self, their perceptions of weaknesses and strengths, willingness to accept challenges and acceptance of change:

Reflecting back on last week, I was feeling quite negative about our new group, and I was concerned about how well we were going to work together. After having a good think about this, I discovered that I don't adapt to change very well! I am sure that is why last week I was not feeling very confident about our group; I was I trying to adjust to the change! This is something that I really need to work on personally, and is a good challenge for myself. (Student W17)

Conclusions and Future Research

This paper describes the first of a four unit program introduced in part to respond to the concerns raised by industry and employer groups about the qualities of university graduates, especially their work-readiness. The objective of the unit, in very broad terms, is to develop a better skill-set and a deeper understanding of aspects of business knowledge (especially communication and teamwork); and to help learners gain wisdom or knowing (Bassett, 2005) by shifting critical reflection from the fringes to a more central role in daily activity. Exploratory research conducted into the extent of critical reflection in journal entries reveals that a start may have been achieved towards achieving these aims. Further research may involve a longitudinal study of students as they progress through the four units in the program and evaluate the extent to which they become reflective practitioners.

References

- Andrews, C. 2005. A critical reflection on transformational learning practice. HERDSA 2005 proceedings.
- Bassett, C. 2005. Wisdom in three acts: Using transformative learning to teach for wisdom. *Proceedings of the sixth international transformative learning conference*, Michigan State University, October 6-9, 2005.
- Belenky, M.F and Stanton, A.V. 2000. Inequality, development and connected knowing. In Mezirow, J (Ed), *Learning as transformation: Critical perspectives on a theory in progress* (pp. 71-102). San Francisco. Jossey-Bass.
- Berger, J. 2004. Dancing on the threshold of meaning: Recognising and understanding the growing edge. *Journal of Transformative Education* 2(4). pp 336-351.
- Business Council of Australia 2002, *Employability Skills for the Future*, Department of Education, Science and Training, Canberra.
- Cranton, P. 1994. Self-directed and transformative instructional development. *Journal of Higher Education*. 65(6) pp. 726-744.
- Cranton, P. 2002. Teaching for transformation. In Imel, S. (Series Ed.) & Ross-Gordon, J. M. (Vol. Ed.), *Contemporary viewpoints on teaching adults effectively: No. 93. New directions for adult and continuing education* (pp. 63-72). San Francisco: Jossey-Bass.
- Cranton, P. and Carusetta, E. 2004. Developing authenticity as a transformative process. *Journal of Transformative Education* 2(4). p 276-293.
- Entwistle, N., and Ramsden, P. 1983. *Understanding Student Learning*, London and Canberra: Croon Helm.
- Feller, A., Jensen, A., Diane, M., Peddigrew, B., Clinchard-Sepeta, L., and Campbell, E. 2004. Quadrinity online: Toward a fuller expression of transformative learning. *Journal of Transformative Learning*. 2(3) pp 219-230.
- Gliscziski, D. 2007. Transformative higher education: a meaningful degree of understanding. *Journal of Transformative Education* 5(4). p 317-328.
- Hsieh, H.-F., & Shannon, S. E. 2005. *Three approaches to qualitative content analysis*. Retrieved 8 March, 2008. <http://ctl.stanford.edu/Newsletter.htm>
- Knowles, M.S., Holston, E., and Swanson, A. 1998. *The adult learner*. Gulf Publishing Company. Houston.
- McGonigal, K. Teaching for transformation: from learning theory to teaching strategies. *Spring 2005 Newsletter*. The Centre for Teaching and Learning. Stanford University.
- McMurray, A.J., Pace, R.W and Scott, D. 2004. *Research: A commonsense approach*. Thomson. Southbank. Victoria.
- Mezirow J. 1981. A Critical Theory of Adult Learning and Education. *Adult Education* , 32 , 3-24.
- Mezirow, J. 1991. *Transformative dimensions of adult learning*. Josey-Bass. San Francisco.
- Mezirow, J. 2000. *Learning as transformation: Critical perspectives on a theory in progress*. San Francisco: Jossey-Bass
- Mezirow, J. 2003. Transformative learning as discourse. *Journal of Transformative Learning*. 1(1) pg 58-63.
- Miller and Seller 1990. *Curriculum: Perspectives and Practices*. San Francisco: Jossey-Bass
- Paton. M. 2006. Reflective Journals and Critical Thinking. *UniServe Science Assessment Symposium Proceedings, 2006*.
- Wang, V.C.X. and Sarbo, L. 2004. Philosophy, role of adult educators, and learning: How contextually adapted philosophies and the situational role of adult educators affect learners' transformation and emancipation. *Journal of Transformative Education*. 2(3) 204-214.